Appl. No. 10/572,664

Response to Non-Final Office Action dated July 31, 2008

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the

application:

Listing of Claims:

Claims 1-11 (canceled):

Claim 12 (currently amended): A nutritional or pharmaceutical composition for at least

one of:-the inhibition of pathogen-pathogenic bacteria adhesion to mammalian cells, or for

preventing,—reducing or inhibiting the invasion and infection of mammalian cells by pathogenpathogenic bacteria, wherein the mammal cells invaded or infected are mammalian gut

or intestinal epithelial cells, the composition comprising: a compound chosen from at least one

of selected from the group consisting of manno-oligosaccharides, caseinoglycomacropeptides

(COMP), methyl manno-oligosaccharides, ehito chito-oligosaccharides, peetie

oligosaecharides, galacto-oligosaecharides (GOS), eurdlan (beta 1,3 glucan), sialyl-

<del>oligosaccharides, i</del>somalto-oligosaccharides, <del>oligogalacturonide, partially hydrolysed guar gum,</del>

gentio-oligosaccharides, arabino-oligosaccharides, peetin, lactose, lactulose, lactosucrose, and

 $long\text{-}chain\ isomal to\text{-}oligos accharides, \underline{and\ combinations\ thereof}.$ 

Claim 13 (currently amended): A-The\_nutritional or pharmaceutical composition

according to claim 12, wherein the compound is ehosen-from at least oneselected from the group consisting of manno-oligosaccharides, peetie-oligosaccharides, sialyl-oligosaccharides,

chito-oligosaccharides, caseinoglycomacropeptide (CGMP), galacto-oligosaccharides (GOS),

eurdlan and partially hydrolysed guar gum, and combinations thereof.

Claim 14 (currently amended): A-The\_nutritional or pharmaceutical composition

according to claim 12, wherein the compound is ehosen from at least-one-ofselected from the group consisting of caseinoglycomacropeptide (CGMP), ehito-chito-oligosaccharides, peetie

oligosaccharides, sialyl-oligosaccharides and curdlanand combinations thereof.

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Claim 15 (currently amended): A—The nutritional or pharmaceutical composition according to claim 12, wherein the manno-oligosaccharide is ehosen from at least one of selected from the group consisting of alpha 1-2 manno-oligosaccharide, alpha 1-3 manno-oligosaccharide, and alpha 1-6 manno-oligosaccharide, and combinations thereof.

Claim 16 (currently amended): A nutritional or pharmaceutical composition for the prevention—or—treatment of acute or chronic pathogenic bacteria—associated enteric disorders in a mammal, or for the prevention—or—treatment of pathogenic bacteria—microflora proliferation in a mammal, the composition emprosing-comprising a compound ehosen from at least—one—of-selected from the group consisting of manno-oligosaccharides, caseinoglycomacropeptides (CGMP), methyl manno-oligosaccharides, ehite—chito-oligosaccharides, peetic-oligosaccharides, galacto-oligosaccharides (GOS), curdlan (beta 1,3-glucan), sialyl-oligosaccharides,—isomalto-oligosaccharides, oligogalacturonide,—partially hydrolysed guar gum, gentio—gentio—oligosaccharides, arabino-oligosaccharides, peetin—lactose, laetulose,—lactosucrose,—and long-chain isomalto-oligosaccharides, and combinations thereof.

Claim 17 (currently amended): A—The\_nutritional or pharmaceutical composition according to claim 16, wherein said acute or chronic pathogenpathogenic bacteria-associated enteric disorders is-are selected from the group consisting of gastroenteritis, ulcerative colitis,-er diarrhoeal diseases, or-aand combinations thereof.

Claim 18 (currently amended): Use of a compound A method for inhibiting pathogenic bacteria adhesion to mammalian cells or for reducing or inhibiting the invasion and infection of mammalian cells by pathogenic bacteria, the method comprising administering to a mammal a compound ehosen from at least one of selected from the group consisting of mannooligosaccharides, caseinoglycomacropeptides (CGMP), methyl manno-oligosaccharides, ehito-oligosaccharides, pectic oligosaccharides, galacto-oligosaccharides (GOS), curdian (beta 1,3-g lucan), sialyl-oligosaccharides, isomalto-oligosaccharides, oligogalacturonide, partially hydrolysed guar gum, gentio-gentio-oligosaccharides, arabino-oligosaccharides, pectin, lactose, lactulose, lactosucrose, and long chain isomalto-oligosaccharides, and combinations thereof, for the inhibition of pathogen adhesion to mammalian cells or for preventing, reducing or inhibiting the invasion and infection of mammalian cells, wherein said mammalian cells are those of the gut and intestinal mammalian cells, by pathogen.

Claim 19 (currently amended): A method of preventing or treating acute or chronic pathogenic bacteria-associated, enteric disorders in a mammal, said method comprising administering to said mammal a therapeutically effective amount of a compound ehosen from at least one of selected from the group consisting of manno-oligosaccharides, caseinoglycomacropeptides (CGMP), methyl manno-oligosaccharides, ehito—chitooligosaccharides, peetie oligosaccharides, galacto-oligosaccharides (GOS), curdlan (beta-1,3-glucan), sialyl-oligosaccharides, peetin, lactose, lactulose, lactosucrose, isomaltooligosaccharides, eligogalacturonide, partially hydrolysed guar gum, gentio—gentiooligosaccharides, arabino-oligosaccharides, and combinations thereof.

Claim 20 (currently amended): A-The method according to claim 19<sub>1</sub> wherein said enteric disorders is—are selected from the group consisting of gastroenteritis, ulcerative colitis, or diarrhoeal diseases, or and combinations thereof.

Claim 21 (currently amended): Use A-The method according to claim 19, wherein the compound is ehosen from at least one of selected from the group consisting of manno-oligosaccharides, peetic-ligosaccharides, sialyl-oligosaccharides,—chito-oligosaccharides, caseinoglycomacropeptide (CGMP), galaeto-oligosaccharides (GOS), curdlan and partially hydrolysed guar gum, and combinations thereof.

Claim 22 (currently amended): A—The method according to claim 19, wherein the compound is ehosen from at least one of selected from the group consisting of caseinoglycomacropeptide (CGMP), ehito-chito-oligosaccharides, peetic oligosaccharides, sialyl oligosaccharides and curdianand combinations thereof.

Claim 23 (currently amended): A-The method according to claim 19, wherein the mannooligosaccharide is ehosen from at least one of selected from the group consisting of alpha 1-2 manno-oligosaccharide, alpha 1-3 manno-oligosaccharide, and alpha 1-6 manno-oligosaccharide, and combinations thereof.

Claim 24 (currently amended): A nutritional or pharmaceutical composition comprising at least one compound—chosen from manno-oligosaceharides—and/or—methyl—manno-oligosaceharides, in-particular-chosen from selected from the group consisting of alpha 1-2 mannobioses, alpha 1-3 mannobioses, alpha 1-6 mannobioses, or—methyl alpha manno-oligosaccharides, and combinations thereof.

Claim 25 (currently amended): A nutritional or pharmaceutical composition comprising at least one compound chosen fromselected from the group consisting of cascinoglycomacropeptides (CGMP), chite-chito-oligosaccharides, peetic oligosaccharides, curdlan (beta 1,3 glucan), sialyl oligosaccharides, isomalto-oligosaccharides, oligosaccharides, chigosaccharides, chigosaccharides, and long-chain isomalto-oligosaccharides, and combinations thereof, and a nutritionally or pharmaceutically acceptable excipient.

Claim 26 (currently amended): A—The nutritional or pharmaceutical composition according to claim 25, wherein the compound is a chosen from at least one of chito-chito-oligosaccharides, peetic-oligosaccharides, sialyl-oligosaccharides and curdlan.

Claim 27 (withdrawn): A screening method to test the anti-adhesive activity of an oligosaccharide which method comprises:

adding oligosaccharide solution to cell monolayers of the human colonic cell line HT29 in triplicate wells,

adding an equal volume of bacterial culture, c)washing of the cell layers after 2h at 37°C aerobic, 5% CO2, detaching cell layers with trypsin/EDTA solution, enumerating bacteria by plate counting, and comparing counts in wells with oligosaccharides to those without.

Claim 28 (currently amended): Use of a compound A method for the manufacture of a nutritional or pharmaceutical composition for the inhibition of pathogen-pathogenic bacteria adhesion to mammalian cells, or for preventing, reducing or inhibiting the invasion and infection of mammalian cells by pathogenpathogenic bacteria, the method comprising adding to the nutritional or pharmaceutical composition a compound selected from the group consisting of wherein said mammalian cells are mammalian gut-or-intestinal epithelial cells, comprising manno-oligosaccharides, caseinoglycomacropeptides (CGMP), methyl manno-oligosaccharides, chito-oligosaccharides, peetic-oligosaccharides, galacto-oligosaccharides (GOS), curdlan (beta 1,3 glucan), sialyl-oligosaccharides, isomalto-oligosaccharides, oligogalacturonide, partially hydrolysed guar gum, gentio-oligosaccharides, arabino-oligosaccharides, peetin-lactose, lactulose and long-chain isomalto-oligosaccharides, or aand combinations thereof, wherein the mammalian cells are mammalian gut or intestinal epithelial cells.

Claim 29 (currently amended): Use-of-a-compoundA method for the manufacture of a nutritional or pharmaceutical composition for the prevention-or-treatment of acute or chronic pathogenic bacteria-associated enteric disorders in a mammal or for the prevention-or-treatment of pathogenic bacteria microflora proliferation in a—the\_mammal, the method comprising adding to the nutritional or pharmaceutical composition a compound selected from the group consisting of chosen-comprising manno-oligosaccharides, cascinoglycomacropeptides (CGMP), methyl manno-oligosaccharides, chito-oligosaccharides, peetic-oligosaccharides, ehito-chito-oligosaccharides, peetic-oligosaccharides, isomalto-oligosaccharides, eligogalacturonide,—partially hydrolysed guar gum, gentic—genticoligosaccharides, arabino-oligosaccharides, peetin,—lactose, lactulose,—lactosucrose,—and long-chain isomalto-oligosaccharides, or-aand combination combinations thereof.

Claim 30 (currently amended): A use-method according to claim 28-29, wherein said enteric disorders are selected from the group consisting of gastroenteritis, ulcerative colitis, or diarrhoeal diseases, and combinations thereof.